

REMARKS

Claims 23-44 were presented for examination in the present application. The instant amendment cancels claims 34-35 without prejudice and adds new claims 45. Thus, claims 23-33 and 36-45 are presented for consideration upon entry of the instant amendment. Claims 23 and 45 are independent.

Independent claim 23, as well as dependent claims 24-28, 34, 37, 39-40, and 43-44, were rejected under 35 U.S.C. §102(b) over U.S. Patent No. 6,326,224 to Xu et al. (Xu). Dependent claims 29-32 were rejected under 35 U.S.C. §103(a) over Xu in view of U.S. Publication No. 2004/0021414 to Hanawa et al. (Hanawa). Dependent claims 33 and 38 were rejected under 35 U.S.C. §103(a) over Xu in view of U.S. Patent No. 6,344,712 to Eida et al. (Eida). Dependent claims 35 and 36 were rejected under 35 U.S.C. §103(a) over Xu in view of U.S. Publication No. 2001/0005114 to Jacobsen et al. (Jacobsen). Dependent claims 41 and 42 were rejected under 35 U.S.C. §103(a) over Xu.

Claim 23 has been amended to include elements of claim 35, which has been cancelled. Thus, present claim 23 now recites that "the light-reflecting layers are arranged **obliquely with respect to one another** (emphasis added)".

The Office Action acknowledges, with respect to claim 35, that Xu does not disclose that the light-reflecting layers are arranged obliquely with respect to one another. Rather, the Office Action asserts that Jacobsen teaches microcavity resonators that may be adjusted to optimize display performance and, based on this teaching, the Office Action asserts that it would have been obvious to obliquely arrange the layers of Xu.

Applicants respectfully disagree.

Xu discloses, with respect to FIG. 2, a multi-microcavity light emitting device 30 includes a light emitting diode, generally designated 31 and a plurality of microcavities 32, and 34 positioned **in tandem** with the light output from diode 31 to successively purify the light spectrum. See col. 3, lines 40-47.

Thus, Xu merely discloses positioning microcavities in tandem, but clearly fails to disclose or suggest the **obliquely arranged** light-reflecting layers of present claim 23. In fact, the "in tandem" requirement of Xu teaches away from the modification proposed by the Office Action. As such, Applicants submit that modification of Xu to the **obliquely arranged** light-reflecting layers of present claim 23 would render Xu inoperative for its intended purpose of "in tandem" arrangement.

Further, Applicants submit that the Office Action has mis-characterized the teachings of Jacobsen.

Jacobsen discloses an invention that employs quantum electrodynamic (QED) theory to enhance the properties of the light emitted from phosphor based luminescence displays. The performance of a given display application depends on properties of the emitted light such as the chromaticity, direction, and flux. These properties can be optimized by employing the principles of QED theory in the design of microcavities so as to control the spontaneous emission characteristics of the phosphor activator for each specific display application. In the embodiment of FIG. 4, Jacobsen discloses that a resonant microcavity 20 is grown on a substrate 25 and includes a front reflector 30, a phosphor-based active region 50, and a back reflector 60. Generally, Jacobsen discloses that the structure may comprise a variety of materials and may employ a variety of resonator designs and may involve stacking multiple microcavities. See paragraphs [0074]-[0076].

However, Jacobsen simply fails to disclose or suggest, other than through the use of the quantum electrodynamic (QED) theory, how the variety of resonator design could be arranged to optimize the performance. There is simply no hint in Jacobsen to **obliquely arrange** the light-reflecting layers of present claim 23.

Rather, Jacobsen specifically discloses that the layers with a relatively low index of refraction alternate with layers comprising a material with a relatively high index of refraction, and that these alternating layers are **parallel**. See claim 44.

Thus, Applicants submit that Jacobsen does not cure the aforementioned deficiencies of Xu, but rather discloses a parallel arrangement and not, the **obliquely arranged** light-reflecting layers of present claim 23.

The Office Action fails to assert that any of the remaining art, namely Hanawa and Eida, cure the aforementioned and other deficiencies of Xu alone or in combination with Jacobsen.

Therefore, present claim 23, as well as claims 24-33 and 36-44 that depend therefrom, are not disclosed or suggested by the cited art. As such, claims 23-33 and 36-44 are in condition for allowance. Reconsideration and withdrawal of the rejections to claims 23-33 and 36-44 are respectfully requested.

Claim 45 has been added to point out various aspects of the present application. Support for new claim 45 can be found at least in original claims 1-22. No new matter is added.

Applicants specifically point out that new claim 45 is not intended to be limited to the specific mechanisms of patentability previously argued with respect to any prior claims in this or any related applications. Accordingly, Applicants hereby rescind any

disclaimer of claim scope and, thus, any prior art for which such a disclaimer was made to avoid may need to be revisited by the Examiner with respect to new claim 45.

Claim 45 is believed to be in condition for allowance. For example, claim 45 recites, in part, that the second light-reflecting layer is "arranged on the transparent substrate **obliquely** with respect to the first light-reflecting layer so that an impression of **optical depth becomes visible** when the laterally structured luminous surface is viewed at right angles (emphasis added)". Applicants submit that the combination of claim 45 is not disclosed or suggested by the cited art.

In view of the above, it is respectfully submitted that the present application is in condition for allowance. Such action is solicited.

If for any reason the Examiner feels that consultation with Applicants' attorney would be helpful in the advancement of the prosecution, the Examiner is invited to call the telephone number below.

Respectfully submitted,

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